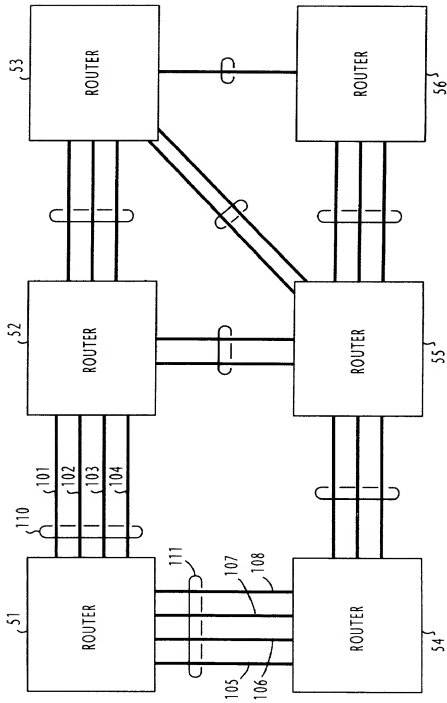


FIG. 1



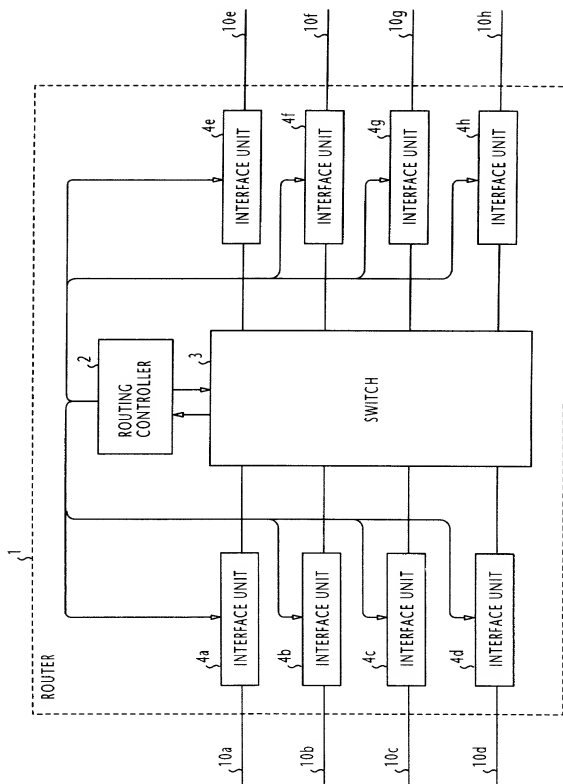
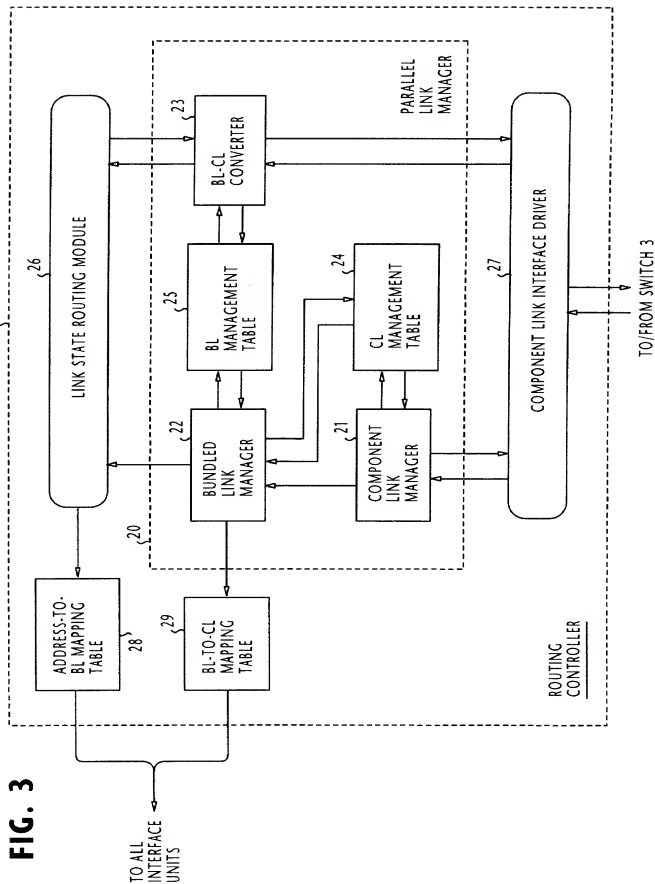
**FIG. 2**

FIG. 3



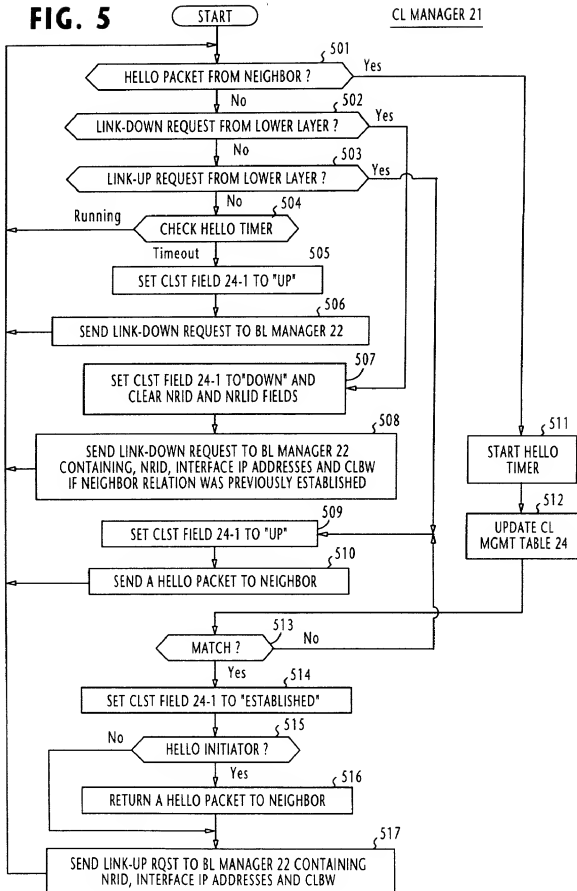
CL MANAGEMENT TABLE 24

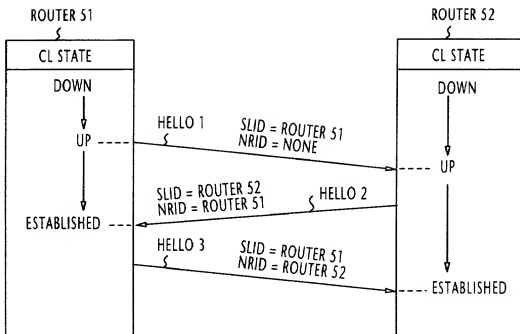
FIG. 4

COMPONENT LINK ID (CLID)	24-1		24-2		24-3		24-4
	COMPONENT LINK STATE (CLST)	NEIGHOR ROUTER ID (NRID)	NEIGHOR ROUTER LINK ID (NCLID)	COMP. LINK BANDWIDTH (CLBW)			
CLID=1	ESTABLISHED	133.206.0.2	NCLID=2	10			
CLID=2	ESTABLISHED	133.206.0.2	NCLID=3	10			
CLID=3	ESTABLISHED	133.206.0.2	NCLID=4	10			
CLID=4	ESTABLISHED	133.206.0.3	NCLID=1	20			
CLID=5	ESTABLISHED	133.206.0.3	NCLID=2	20			
CLID=6	UP	133.206.0.3	NCLID=3	20			
CLID=7	UP	—	—	10			
CLID=8	UP	—	—	10			
CLID=9	DOWN	—	—	30			
CLID=10	DOWN	—	—	30			

**FIG. 5**

CL MANAGER 21



**FIG. 6**

**FIG. 7**

BL MANAGEMENT TABLE 25

FIG. 7

BUNDLED LINK IDENTIFIER (BLID)	25-1		25-2	25-3	25-4		25-5	25-6
	NEIGHOR ROUTER ID (NRID)	BUNDLED LINK STATE (BLST)	NUMBER OF COMP. LINKS (CLN)	LOCAL INTERFACE IP ADDRESS	NEIGHOR INTERFACE IP ADDRESS	TOTAL (BL) BANDWIDTH (BLBW)		
	11	133.206.0.2	UP	3	133.206.10.1	133.206.10.2	30	
	12	133.206.0.3	UP	2	UNNUMBERED	UNNUMBERED	40	
	13	133.206.0.4	DOWN	0	133.206.30.1	133.206.30.4	0	

**FIG. 8**

BL-TO-CL MAPPING TABLE 29

BUNDLED LINKS	BLID=11	COMP. LINKS	CLID=1	CLID=2	CLID=3	—
		USAGE RATIO	R1	R2	R3	—
	BLID=12	COMP. LINKS	CLID=4	CLID=5	—	—
		USAGE RATIO	R4	R5	—	—

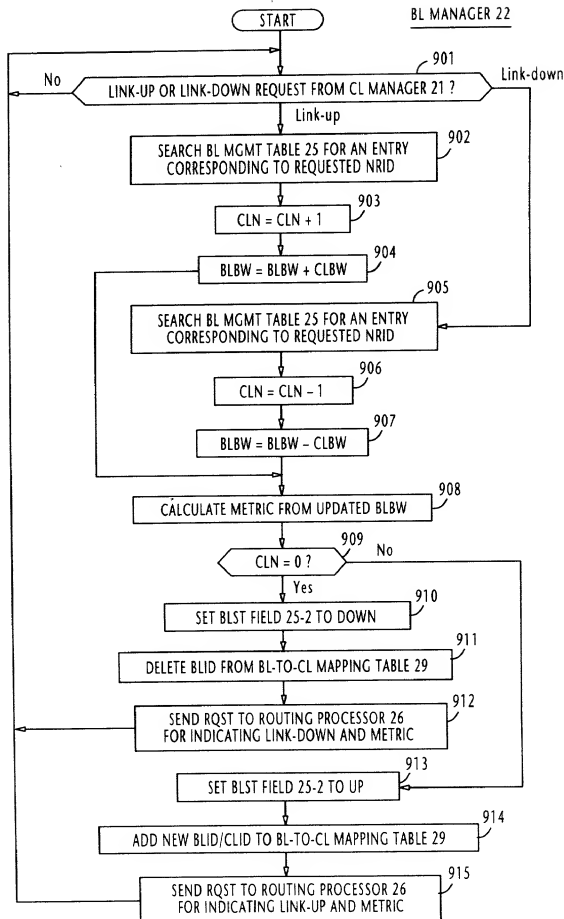
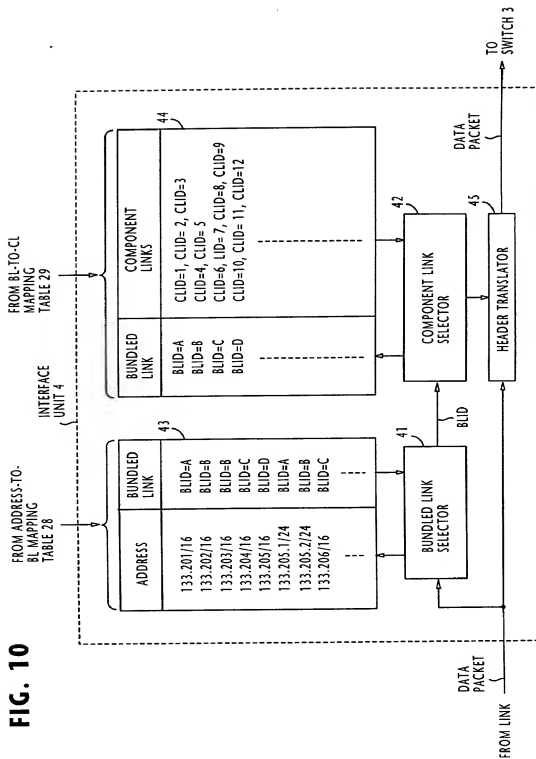
**FIG. 9**



FIG. 10



**FIG. 11**

**BL MANAGEMENT TABLE 25**

BUNDLED LINK IDENTIFIER (BLID)	25-1		25-2		25-3		25-4		25-5		25-6		25-7	
	NEIGHBOR ROUTER ID (NRID)	BUNDLED LINK STATE (BLST)	NUMBER OF COMP. LINKS (CLN)	LOCAL INTERFACE IP ADDRESS	NEIGHBOR INTERFACE IP ADDRESS	TOTAL BANDWIDTH (BLBW)	COMP. LINK BANDWIDTH (CLBW)							
11	133.206.0.2	UP	3	133.206.10.1	133.206.10.2	30	10							
12	133.206.0.3	UP	2	UNNUMBERED	UNNUMBERED	40	20							
13	133.206.0.4	DOWN	0	133.206.30.1	133.206.30.4	0	0							

**FIG. 12** BL MANAGEMENT TABLE 25

BUNDLED LINK IDENTIFIER (BLID)	25-1		25-2		25-3		25-4		25-5		25-6		25-7	
	NEIGHOR ROUTER ID (NRID)	BUNDLED LINK STATE (BLST)	NUMBER OF COMP. LINKS (CLN)	LOCAL INTERFACE IP ADDRESS	NEIGHOR INTERFACE IP ADDRESS	TOTAL BANDWIDTH (BLBW)	COMP. LINK BANDWIDTH (CLBW)							
11	133.206.0.2	UP	3	133.206.10.1	133.206.10.2	30	10							
12	133.206.0.3	DOWN	0	133.206.20.1	UNNUMBERED	0	0							



BUNDLED LINK IDENTIFIER (BLID)	25-1		25-2		25-3		25-4		25-5		25-6		25-7	
	NEIGHOR ROUTER ID (NRID)	BUNDLED LINK STATE (BLST)	NUMBER OF COMP. LINKS (CLN)	LOCAL INTERFACE IP ADDRESS	NEIGHOR INTERFACE IP ADDRESS	TOTAL BANDWIDTH (BLBW)	COMP. LINK BANDWIDTH (CLBW)							
11	133.206.0.2	UP	3	133.206.10.1	133.206.10.2	30	10							
12	133.206.0.3	UP	1	133.206.20.1	133.206.10.3	40	40							

FIG. 13

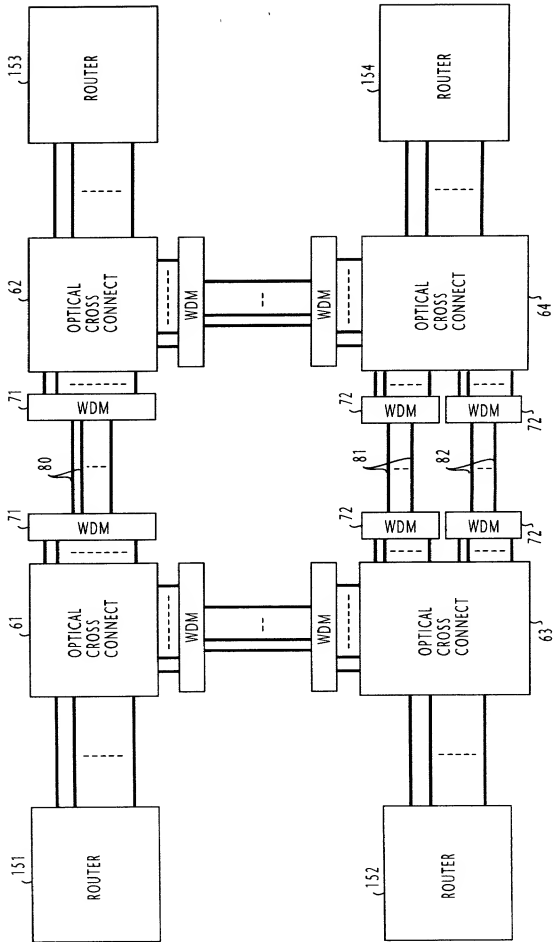
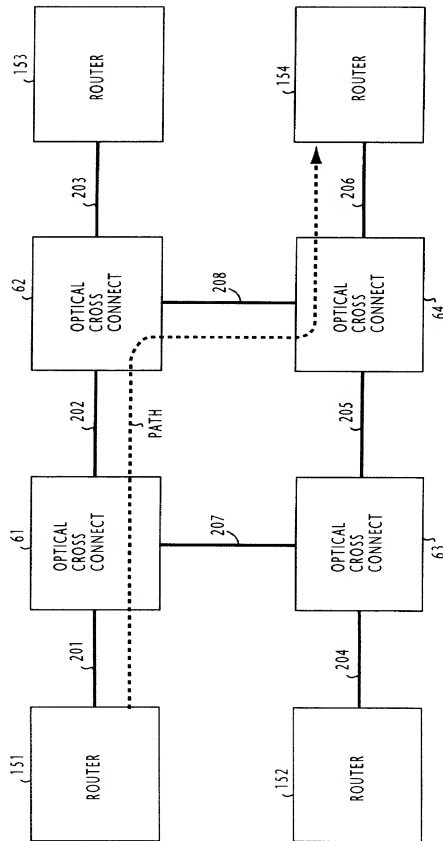


FIG. 14



**FIG. 15**

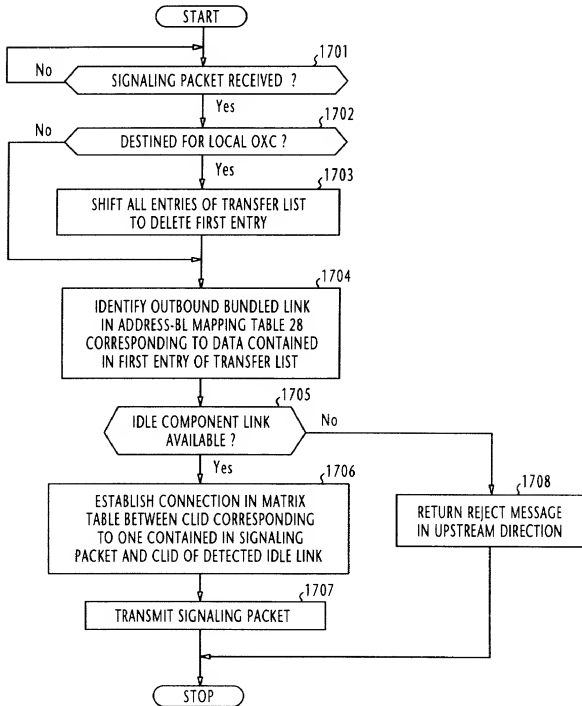
CL MANAGEMENT TABLE 24A

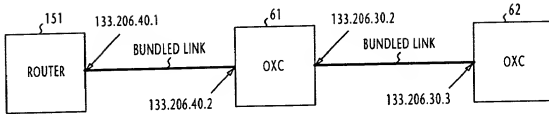
COMPONENT LINK ID (CLID)	COMPONENT LINK STATE (CLST)	NEIGHBOR ROUTER ID (NRID)	NEIGHBOR ROUTER LINK ID (NCLID)	COMP. LINK BANDWIDTH (CLBW)	BUSY/IDLE FLAG
CLID=1	ESTABLISHED	133.206.0.2	NCLID=2	10	B/I
CLID=2	ESTABLISHED	133.206.0.2	NCLID=3	10	B/I
CLID=3	UP	133.206.0.2	NCLID=4	10	B/I
CLID=4	DOWN	133.206.0.3	NCLID=1	20	B/I
CLID=5	DOWN	133.206.0.3	NCLID=2	20	B/I

**FIG. 16**

BL MANAGEMENT TABLE 25A

BUNDLED LINK IDENTIFIER (BLID)	NEIGHBOR ROUTER ID (NRID)	BUNDLED LINK STATE (BLST)	NUMBER OF IDLE COMPONENT LINKS (ILN)	NUMBER OF COMPONENT LINKS (CLN)	LOCAL INTERFACE IP ADDRESS	NEIGHBOR INTERFACE IP ADDRESS
11	133.206.0.1	UP	1	3	133.206.40.1	133.206.40.1
12	133.206.0.3	UP	1	3	133.206.30.2	133.206.30.3

**FIG. 17**OPTICAL CROSS-CONNECT (OXC) NODE

**FIG. 18A****FIG. 18B**